

WHAT IS CLAIMED IS:

1. A motor-driven pump unit comprising:

5 an electric motor having a stator and a rotor;

a pump being concentrically enclosed by said rotor, said rotor having a U-shape when viewed in an axial sectional view, wherein said U-shape has a web that is provided in the region of a common axis, said web having an internal
10 gearing, and wherein said pump has a shaft that has a pinion that mates with said internal gearing of said web; and

a housing having a face wall on a web side and an
15 opposite face on a connection side that carries connections for a medium to be conveyed, wherein said housing is arranged in a region of said face wall on said web side as a container for receiving said medium, for receiving a cooling device or for receiving a filtering device.

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2. The motor-driven pump unit of claim 1, wherein said housing is arranged as a valve block in a region of said opposite face on said connection side, said valve block has a flow control device selected from the group consisting
25 essentially of a directional control valve, a safety valve, a pressure reducing valve, a quantity divider, a flow control valve, a stop valve, a proportional valve, and any combinations thereof.

30 3. The motor-driven pump unit of claim 1, wherein

said rotor encloses said pump and is operably connected to said housing.

4. The motor-driven pump unit of claim 1, wherein
5 said pump is a hydraulic pump.

5. The motor-driven pump unit of claim 1, wherein said medium from said pump has a throughput with at least a portion thereof that is used for cooling said motor.

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6. The motor-driven pump unit of claim 1, wherein said web of said U-shape and said face wall of said housing on said web side has therebetween a tank, wherein said shaft of said pump projects into said tank and carries an
15 impeller, and wherein said impeller can convey cooling medium out of said motor into said pump.

7. A motor-driven pump unit comprising:

20 an electric motor having a stator and a rotor;

a pump being concentrically enclosed by said rotor, said rotor having a U-shape when viewed in an axial sectional view, wherein said U-shape has a web that is provided in the
25 region of a common axis, said web having an internal gearing, wherein said pump has a shaft that has a pinion that mates with said internal gearing of said web; and

a housing having a face wall on a web side and an
30 opposite face on a connection side that carries connections for a medium to be conveyed, wherein said housing is arranged as a valve block in a region of said opposite face

on said connection side, and wherein said valve block has a flow control device selected from the group consisting essentially of a directional control valve, a safety valve, a pressure reducing valve, a quantity divider, a flow control valve, a stop valve, a proportional valve, and any combinations thereof.

8. The motor-driven pump unit of claim 7, wherein said rotor encloses said pump and is operably connected to said housing.

9. The motor-driven pump unit of claim 7, wherein said pump is a hydraulic pump.

10. The motor-driven pump unit as claimed in claim 7, wherein said medium from said pump has a throughput with at least a portion thereof that is used for cooling said motor.

11. The motor-driven pump unit of claim 7, wherein said web of said U-shape and said face wall of said housing on said web side has therebetween a tank, wherein said shaft of said pump projects into said tank and carries an impeller, and wherein said impeller can convey cooling medium out of said motor into said pump.